COMPARATIVE EXAMPLE 4

A lithographic printing plate was prepared in the same manner as in Example 1 except for changing Compound having ethylenically unsaturated bond (A1) to Compound A2 shown below.

A2

lithographic printing With the plates according to the plate-making methods in Examples 1 to 9 and Comparative Example 1 to 4, developing property, press life and printing stain were evaluated. The surface of printing plate after the development processing was visually observed and the developing property evaluated from the presence or absence of residual film and the extent of residual film. The printing plate was subjected to printing by a printing machine (R 201 Type manufactured by Man Roland Co., Ltd.) using ink (GEOS G Black (N) manufactured by Dai-Nippon Ink & Chemicals, Inc.) and the press life was evaluated from the number of sheets in which disappearance of dots of 3% was observed. The printing stain was evaluated by conducting printing by a printing machine (Dia IF2 Type manufactured by Mitsubishi Heavy Industry Co., Ltd.) using ink (GEOS G Red (S) manufactured by Dai-Nippon Ink & Chemicals, Inc.) and visually observing printing stain in the non-image area. The results obtained are shown in Table 3 below.

	Developing	Press	Printing
	Property	Life	Stain
Example 1	No residual	250,000	No stain
	film	sheets	
Example 2	No residual	280,000	No stain
	film	sheets	
Example 3	No residual	250,000	No stain
	film	sheets	
Example 4	No residual	250,000	No stain
	film	sheets	
Example 5	No residual	270,000	No stain
	film	sheets	
Example 6	No residual	200,000	No stain
	film	sheets	
Example 7	No residual	250,000	No stain
	film	sheets	
Example 8	No residual	300,000	No stain
	film	sheets	
Example 9	No residual	300,000	No stain
	film	sheets	
Comparative	Slight	250,000	Severe
Example 1	residual film	sheets	stain
Comparative	Remarkable	100,000	Severe
Example 2	residual film	sheets	stain
Comparative	No residual	5,000	No stain
Example 3	film	sheets	
Comparative	No residual	80,000	No stain
Example 4	film	sheets	

It can be seen from the results shown in Table 3 that each lithographic printing plate of the examples according to the present invention exhibits sufficient results. On

the contrary, each lithographic printing plate of the comparative examples is insufficient in at least one of the results of evaluation.

As described above, the plate-making method of a lithographic printing plate according to the present invention, which use a photosensitive lithographic printing plate having a photosensitive layer comprising a photopolymerizable composition and a developing solution comprising an aqueous alkali solution having a relatively low pH and containing a nonionic surface active agent having the specific structure, is able to produce a lithographic printing plate that has good developing property and is free from printing stain and excellent in press life. Further, the developing solution is excellent in preservation stability and since the pH of the developing solution is relatively low, it is preferable in view of safety and effective on improvement in the influence of waste liquid upon environment.

While the invention has been described in detail and with reference to specific examples thereof, it will be apparent to one skilled in the art that various changes and modifications can be made therein without departing from the spirit and scope thereof.